

Sustainable Tick Control: Conclusions From Two Years of the RMSF Rodeo

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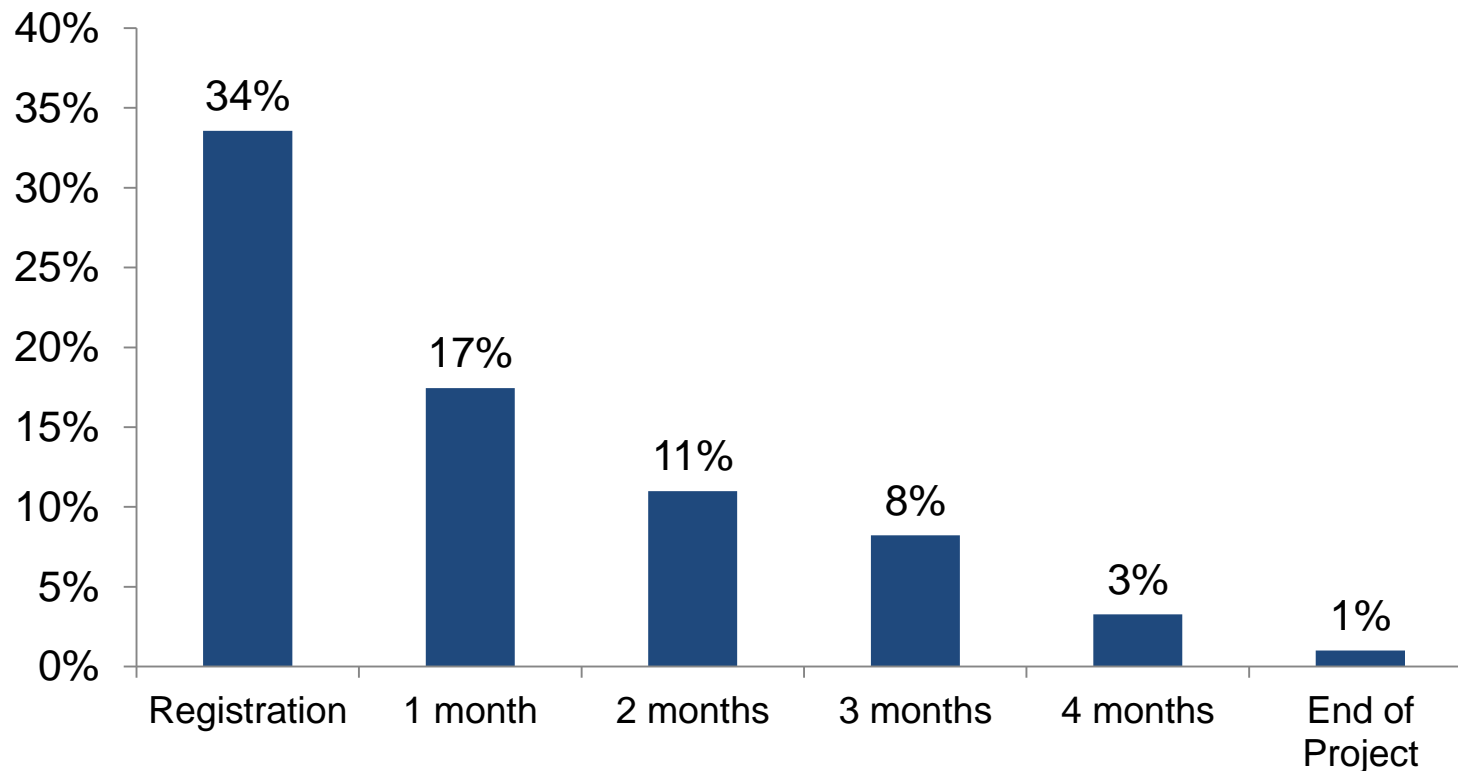


The RMSF Rodeo

- A neighborhood pilot project on the San Carlos Apache Reservation
- Goal: Improve human health by improving the health of pets
 - PHASE I:
 - Prove tick control is possible on a small scale
 - Monthly yard treatments
 - Long-lasting tick collars on all dogs
 - Provide data for tribe to expand reservation-wide
 - PHASE II:
 - Prove tick control can be maintained with collars alone once low-levels have been established

Phase I of the RMSF Rodeo

- Dramatic reduction in ticks present on dogs measured in August 2012



Phase II of the RMSF Rodeo

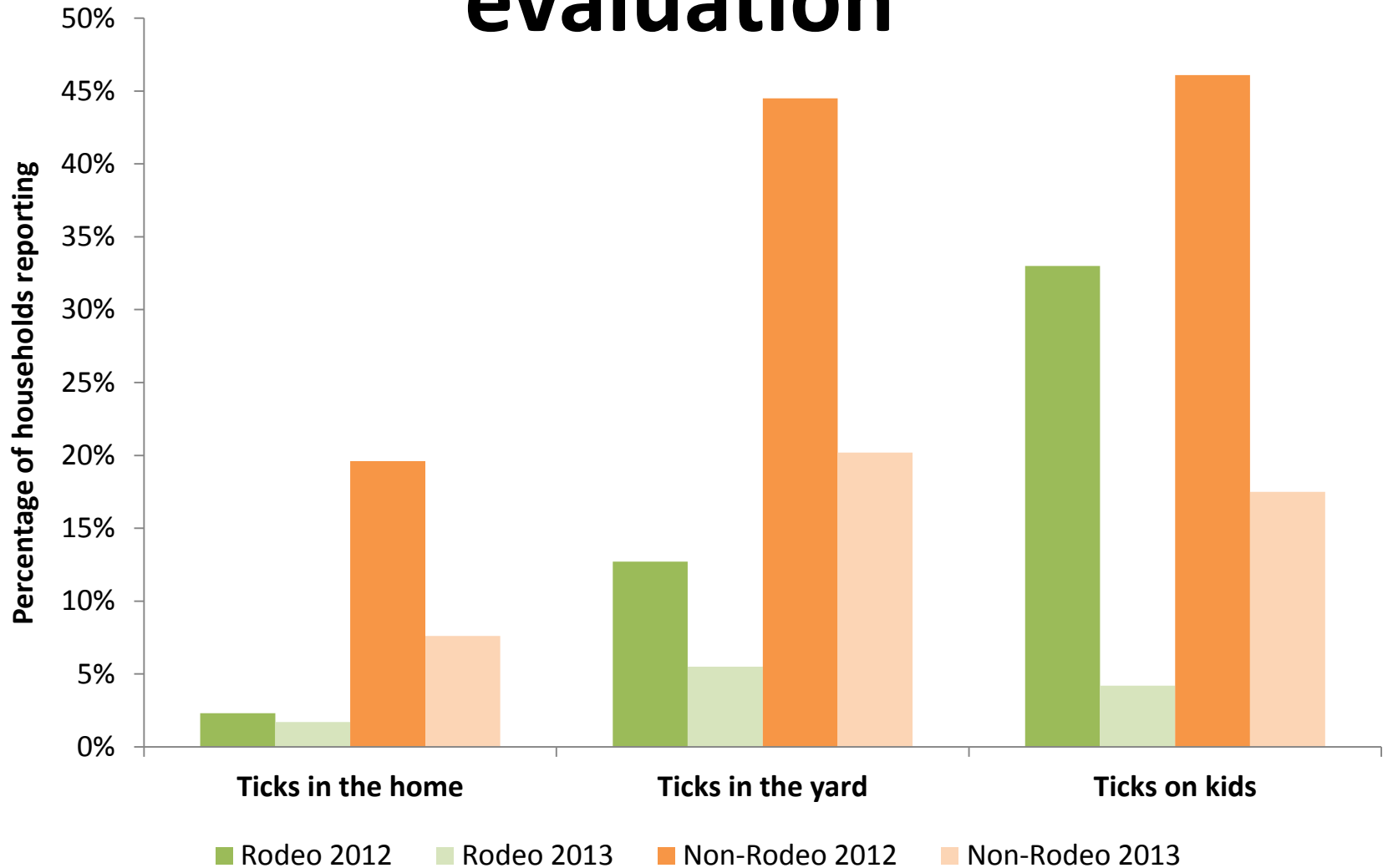
- March risk assessment showed ~5% of dogs had ticks
- 558/571 (98%) of occupied homes in Peridot Heights participated
- >1000 dogs collared and tracked in bi-monthly checks (March, May, July and September)
- Only 27 homes (<5%) referred for yard treatment during 2013 due to presence of ticks

Household Surveys

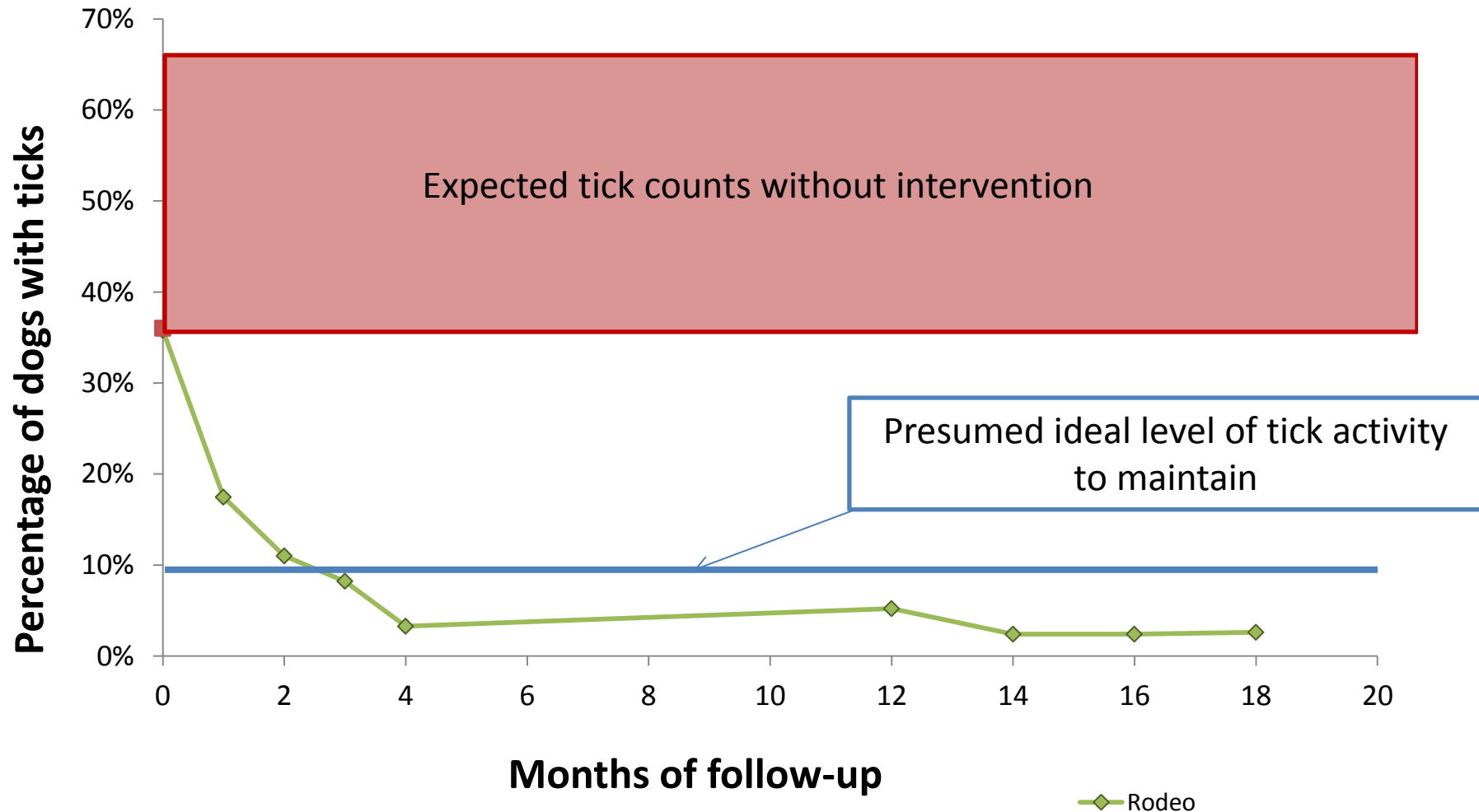
- At the end of each year of the project, a large-scale program evaluation survey was conducted both inside and outside the project areas
- Household surveys assessed the knowledge, attitudes and practices relating to dog and tick control on San Carlos and provided systematic tick counts
- 2012: 426 completed surveys
- 2013: 397 completed surveys



Reported tick levels at program evaluation



Observed tick levels on dogs throughout the RMSF Rodeo



Observed ticks on dogs at year end evaluations

	Expected (Non-Rodeo)	Rodeo 2012	Rodeo 2013
No Ticks	36.1%	99.2%	97.7%
Ticks	63.9%	0.8%	2.3%



Tick control timeline

RMSF Rodeo 2012

RMSF Rodeo 2013

**Monthly yard treatments
and
Seresto collars on all
dogs**

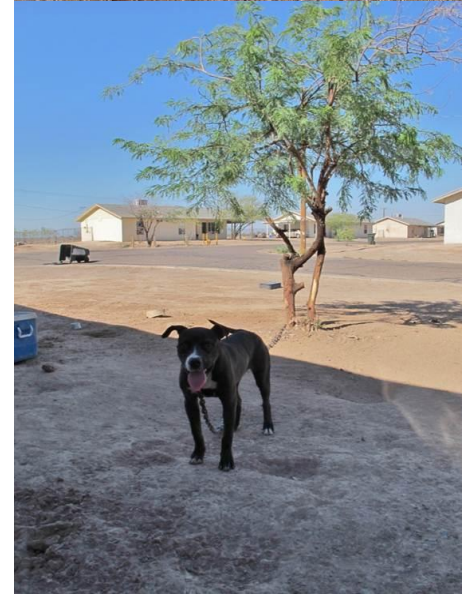
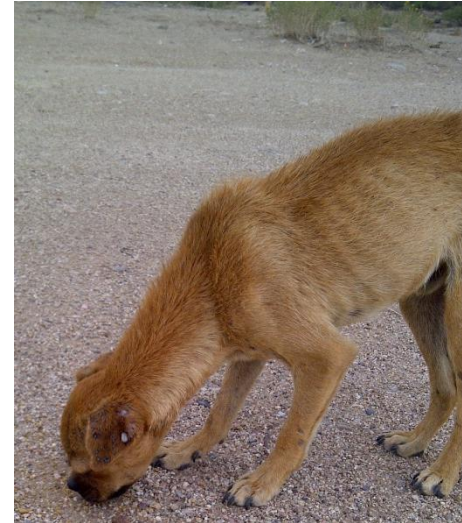
**Achieve
low tick
levels
($<10\%$ of
dogs)**

**Spot yard treatments
and
Seresto collars on all
dogs**

Reservation-wide 2013

The keys to low tick counts

- Maintaining collars on dogs
 - Collared dogs were 82% less likely to have tick infestations
- Restraint practices of dogs
 - Dogs that were always restrained were 56% less likely to have tick infestations compared to dogs that were never restrained



Important notes

- We did not find that households with more than 2 dogs were any more likely to have ticks than households with 1 or 2 dogs.
- Plan for 25-50% replacement of collars per season
- Change in knowledge, attitudes, and practices takes time



Take away points from the RMSF Rodeo

- Multiple, and properly timed, yard treatments are necessary to knock down tick levels
- Long-lasting tick collars can maintain low-levels of tick infestation, once control of tick levels has been achieved
- Routine monitoring of tick levels on dogs and replacement of tick collars is **vital** for continued control and allows you to
 - Replace lost collars
 - Identify hotspots
 - Make necessary adjustments to prevention practice



Thank you!

